

**Before the  
FEDERAL COMMUNICATIONS COMMISSION  
Washington, DC 20554**

In the Matter of	)	
	)	
Digital Audio Broadcasting Systems	)	MM Docket No. 99-325
And Their Impact On the Terrestrial Radio	)	
Broadcast Service	)	

To: The Commission

**REPLY COMMENTS OF NATIONAL PUBLIC RADIO, INC.**

National Public Radio, Inc. (“NPR”) hereby replies to the comments filed in response to the Commission’s Public Notice regarding the iBiquity Digital Corporation (“iBiquity”) AM In-Band On-Channel (“IBOC”) Digital Audio Broadcasting (“DAB”) system.<sup>1</sup>

**I. Introduction**

In its initial Comments, NPR urged the FCC to adopt the iBiquity AM hybrid-mode IBOC DAB system for daytime service and to encourage the expeditious development and testing of an AM IBOC DAB system for nighttime service. NPR also argued that the iBiquity technology should be licensed for use by noncommercial educational (“NCE”) radio stations either without charge or under terms and conditions that are reasonable and predictable under the circumstances for NCE broadcasters.

The comments filed in this proceeding, like those of NPR, overwhelmingly support the prompt adoption of the AM IBOC DAB system for daytime service. The

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<sup>1</sup> Public Notice, Comment Sought on National Radio Systems Committee DAB Subcommittee’s “Evaluation of the iBiquity Digital Corporation IBOC System”, MM

comments provide strong evidence of the benefits of the AM IBOC DAB system for daytime operation, including the promise of significantly improved AM signal quality. One party, Clear Channel Communications, Inc., advocates the adoption of the AM IBOC DAB system for daytime service with a caveat: it suggests a 6 dB reduction in the power level used in iBiquity's AM IBOC tests to minimize the potential impact on first adjacent analog listening at the edge of coverage. In light of these interference concerns, NPR urges the FCC to scrutinize the field experience of the first AM IBOC stations carefully and to define the power level limits in its final IBOC rules as necessary to minimize interference to analog AM stations and to maximize new digital service. However, NPR continues to support the prompt adoption of the iBiquity AM IBOC DAB system on an interim basis.

A number of commenters, like NPR, urge the Commission to facilitate the expeditious development and testing of an AM IBOC DAB system for nighttime service. The benefits of digital operation should be enjoyed by audiences and stations around the clock. NPR believes, however, that Cox Radio, Inc.'s request for the FCC to begin a mandatory phasing out of analog AM broadcast service upon completion of nighttime testing is premature. At this point, the transition from analog AM broadcasts should be guided by public demand, station resources and licensee calculations of the rewards and risks of migrating to all-digital transmissions.

**II. The Commission Should Adopt The iBiquity AM IBOC DAB System for Daytime Service, But It Should Closely Scrutinize The Impact Of The First AM IBOC Stations On Analog AM Stations And Adjust The Final Rules As Necessary To Minimize Interference.**

The broadcasters, manufacturers and industry organizations submitting comments in this proceeding overwhelmingly support the prompt adoption by the FCC of the iBiquity AM IBOC DAB system for daytime service.<sup>2</sup> As numerous commenters point out, the AM IBOC technology has the potential to improve AM signal quality dramatically and thus to revitalize the AM band.<sup>3</sup> The expected improvement in AM signal quality is essential if AM radio is to remain competitive in the new digital media environment.<sup>4</sup> The commenters further demonstrate that the iBiquity AM IBOC DAB system satisfies many of the FCC's evaluative criteria for digital audio broadcasting, including enhanced audio fidelity, robustness, compatibility, flexibility, auxiliary capacity and coverage.<sup>5</sup> Because of these substantial benefits, NPR reiterates its support for the prompt adoption of the iBiquity AM IBOC DAB system for daytime service.

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<sup>2</sup> See Comments of NPR at 3-4; Comments of Greater Media, Inc. at 2, 4; Comments of Cox Radio, Inc. at 1-2; Comments of Infinity Broadcasting Corp. at 8-9; Comments of Journal Broadcast Corp. at 2; Comments of Susquehanna Radio Co. at 4; Comments of Clear Channel Communications, Inc. at 1-5 (supporting the prompt adoption of the iBiquity AM IBOC DAB system with one modification, as described below); Comments of iBiquity at 11-12; Comments of Harris Corp. at 1-3; Comments of National Association of Broadcasters at 3-8. However, a number of individual members of the public submitted comments opposing the iBiquity AM IBOC DAB system.

<sup>3</sup> See Comments of NPR at 3-4; Comments of Infinity Broadcasting Corp. at 2-3; Comments of Journal Broadcast Corp. at 2; Comments of Greater Media, Inc. at 2-3.

<sup>4</sup> See Comments of NPR at 4; Comments of Infinity Broadcasting Corp. at 2.

<sup>5</sup> See Comments of NPR at 3-4; Comments of iBiquity at 5-11; Comments of Journal Broadcast Corp. at 3; Comments of Susquehanna Radio Co. at 3; Comments of National Association of Broadcasters at 4-8.

One commenter, Clear Channel Communications Corp., urges the Commission to make one modification to the iBiquity IBOC DAB system -- a 6 dB reduction in the power level used in iBiquity's AM IBOC tests. Clear Channel reasons that the digital AM IBOC signal now proposed for hybrid-mode operation may affect first adjacent analog listening, since stations on first adjacent channels to analog stations implementing hybrid AM IBOC will be sharing that station's primary digital sidebands. Clear Channel recommends a 6 dB reduction in power levels for the interim adoption of hybrid AM IBOC to ensure a smooth transition to AM IBOC.<sup>6</sup>

Although NPR continues to support the prompt adoption of the iBiquity AM IBOC DAB system on an interim basis, NPR believes that Clear Channel's heightened interference concerns warrant further consideration. There is a critical need to avoid the unnecessary interference that has compromised AM vitality. The FCC should scrutinize the field experience of the first hybrid AM IBOC stations very carefully. If the field experience identifies unacceptable interference to adjacent channel analog AM service from these first AM IBOC operations, the Commission should adjust the power level limits in its final IBOC rules as necessary to minimize this interference and maximize new digital service.<sup>7</sup>

### **III. The Commission Should Facilitate The Rapid Development And Testing Of An Acceptable AM IBOC DAB System For Nighttime Service.**

The commenters in this proceeding agree that further development and testing is required before AM IBOC can be authorized for nighttime operation, since first adjacent

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<sup>6</sup> See Comments of Clear Channel Communications, Inc. at 1-5.

interference could pose significant problems for nighttime listeners.<sup>8</sup> Several commenters, including NPR, urge the FCC to encourage the expeditious development and testing of an acceptable AM IBOC DAB system under nighttime propagation standards.<sup>9</sup> As NPR stated in its initial Comments, the Commission's efforts should include allocating resources of the FCC's Office of Engineering and Technology to examine a nighttime AM IBOC service.<sup>10</sup> The Commission also should move forward quickly with the comment process for nighttime AM IBOC operations as soon as nighttime testing is complete, as Cox Radio, Inc. suggests.<sup>11</sup> The public interest will be best served if the AM IBOC service is available around the clock.<sup>12</sup>

#### **IV. It Is Premature To Set A Timetable For Phasing Out Analog AM Service.**

Cox Radio, Inc. states that when nighttime testing is complete, the FCC should consider phasing out analog AM service. Cox Radio, Inc. also asks the FCC to establish a reasonably swift timetable for completing the digital AM transition.<sup>13</sup> The

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<sup>7</sup> If interference arises in only a few instances, the Commission may need to adjust power level limits for individual IBOC stations on a case-by-case basis.

<sup>8</sup> See Comments of NPR at 5; Comments of Greater Media, Inc. at 3; Comments of Infinity Broadcasting Corp. at 8; Comments of Journal Broadcast Corp. at 2; Comments of Susquehanna Radio Co. at 4; Comments of Clear Channel Communications, Inc. at 5; Comments of Harris Corp. at 3; Comments of National Association of Broadcasters at 9.

<sup>9</sup> See Comments of NPR at 5-6; Comments of Journal Broadcast Corp. at 2; Comments of Cox Radio, Inc. at 3.

<sup>10</sup> See Comments of NPR at 6.

<sup>11</sup> See Comments of Cox Radio, Inc. at 3.

<sup>12</sup> See Comments of NPR at 6; Comments of Journal Broadcast Corp. at 2.

<sup>13</sup> See Comments of Cox Radio, Inc. at 2.

establishment of such a timetable is unnecessary at this time. Since the hybrid-mode AM IBOC system uses the existing spectrum for both analog and digital service, it does not render existing analog receivers obsolete. Thus, there is no current need to mandate a conversion to all digital or hybrid digital operation, as in the case of the DTV transition. While the Commission should seek to maximize the potential benefits of the IBOC DAB system to consumers, stations should, at this point, be able to make the conversion as their resources and the public's demand for digital services dictate.<sup>14</sup>

**V. In Adopting The iBiquity AM IBOC DAB System, The Commission Should Ensure That The Costs of Licensing The iBiquity Technology Are Not Unreasonably Burdensome For Noncommercial Educational Broadcasters.**

In adopting the iBiquity AM IBOC DAB system, the Commission should ensure that the costs of licensing the iBiquity technology are not unreasonably burdensome for NCE radio stations. As NPR recommended in its initial Comments, the technology should be licensed for use by NCE radio stations either without charge or under terms and conditions that are reasonable and predictable under the circumstances for NCE broadcasters.<sup>15</sup> This would comport with the Commission's goal of limiting the costs of implementing DAB.<sup>16</sup>

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<sup>14</sup> While it might make sense to consider mandating conversion at a future date -- such as once market penetration reaches a certain level -- it would be premature to do so now.

<sup>15</sup> See Comments of NPR at 5.

<sup>16</sup> See In the Matter of Digital Audio Broadcasting Systems and Their Impact on the Terrestrial Broadcast Service, Notice of Proposed Rulemaking, MM Docket No. 99-325, 15 FCC Rcd 1722, at ¶¶ 20-23 (1999); Public Notice at 1. See also 47 C.F.R. §§ 1.1114(c) (exempting NCE broadcasters from licensing fees), 1.1162(e) (exempting NCE broadcasters from regulatory fees).

## **VI. Conclusion**

For the reasons set forth in NPR's initial Comments and in these Reply Comments, NPR advocates the prompt adoption of the iBiquity AM IBOC DAB system for daytime service, with careful scrutiny of the field experience of the first AM IBOC stations so that power levels in the final AM IBOC rules can be adjusted as necessary to minimize interference. NPR further urges the Commission to encourage the expeditious development and testing of an acceptable AM IBOC DAB system for nighttime service.

Respectfully submitted,

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